

MEDRICKY, Z

V 216. DRY QUENCHING OF COKE. Medricky, Z. (Pativa (Pavla, Prague),
Aug. 1955, vol. 35, 217-223). The possibility of using waste heat from coke
for steam raising, and the resultant economy, are examined. The various
methods of quenching are compared and the effect of dry quenching on coke
quality is discussed. (t.l.) FU

MEDRICKY, Z. ; STUCHLIK, V.

Should we use one or two receiving chambers?

P. 226, (Paliiva) Vol. 37, no. 7, 1957, Praha, Czechoslovakia

SO: Monthly Index of East European Accessions (EEAI) Vol. 6, No. 11 November 1957

VEDICKY, Z.
Hard pitch as raw material for electrodes. Z. Medvedev and K. Krupnik. Patent 37, 336-9(1957). A continuous lab. scale process is based on blowing air through heated pitch (I). I is metered from a column heated to 280-300° to a heat exchanger where its temp. drops to 200-40° and then to 2 tanks in series. Air under 2-atm. pressure is blown at the bottom of the tanks through I which travels from the bottom of the 1st tank to the top of the 2nd and from it into a flat storage vessel. The important factors in the process are the amt. of air, the temp. of the incoming I. *2*

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CIA-RDP86-00513R001033220010-9"

CZECHOSLOVAKIA/Chemical Technology. Chemical Products and
Their Application. Treatment of Solid Mineral
Fuels.

H

Abs Jour: Ref Zhur-Khin., No 13, 1958, 44514.

Author : Riedl R., Medricky Z., Potonsky V.

Inst :

Title : Coking of Coal Tar Pitch.

Orig Pub: Paliva, 1957, 37, No 12, 406-411.

Abstract: Experiments on coking of coal tar pitch in cylindrical steel vessels placed in a coking oven in which was conducted its industrial coking for the production of electrode coke; the vessel held 60 kg of pitch comminuted to a particle size of less than 40 mm; the experiments were conducted at a temperature of about 1080°. Determinations were

Card : 1/2

Country	: Czechoslovakia	H-22
Category	:	
Abs. Jour.	:	39980
Author	: Medricky, Z.	
Institut.	: Not given	
Title	: Notes on the Technology of Pitch Coke Production	
Orig Pub.	: Paliva, 38, No 5, 165-167 (1958)	
Abstract	: The author discusses temperature changes occurring in the coking charge during the coking of solid pitch (P). The production data are compared with the curve giving the temperature changes which occur during the coking of P in a steel cylinder. When the coking time is 24 hrs, no differences could be detected between the temperature curves obtained in full-scale commercial ovens and those obtained in steel cylinders. The main conversion of P occurs at 450°. An increase of the coking time to 24-26 hrs is not held necessary. The author indicates that a reduction in the width of the oven results in a decrease of the coke fraction having a fibrous structure with a resulting increase in the	
Card:	1/1	

MEDRICKY, Z., inz.; KANA, J., inz.

Thermal conditions of coking-oven batteries. Paliwa 41
no.1:14-19 Ja '61.

1. Nova hut Klementa Gottwalda, koksovna.

MEDRICKY, Z., inz.

Possibility of increasing labor productivity in coking plants. Paliva 41 no.3:73-76 Mr '61.

1. Koksovna, Nova hut Klementa Gottwalda.

MEDRICKY, Z., inz.

Measurement of the collecting space during coking. Paliva
41 no.6:196-197 Je '61.

1. Nova hut Klementa Gottwalda, koksovna.

MEDRICKÝ, Z., inz.

New design of saturators in Klement Gottwald New Metallurgical
Plant. Paliva 42 no.1:21-25 Ja '62.

1. Koksovna, Nova Hut Klementa Gottwalda .

MEDRICKY, Z., inz.

Notes on experimental operation of coke oven batteries.
Paliva 42 no.8:242-245 Ag '62.

1. Koksarensky vyzkum, Vyzkumny a zkusebni ustav, Nova hut
Klementa Gottwalda.

MEDRICKY, Z., inz.

Use of radioisotopes in Polish coking plants. Paliva 42 no.9:
272-274 S 162.

1. Koksarensky vyzkum, Vyzkumny a zkusebni ustav, Nova hut
Klementa Gottwalda.

MEDRICKY, Z., inz.

Causes of damage on coking chamber masonry. Paliva 42 no.10:308-310 0 '62.

1. Vyzkumny a zkusebni ustav, Nova hut Klementa Gottwalda, koksarensky vyzkum.

MEDRICKY, Zdenek, inz.; STUCHLIK, Vl., inz.

Present situation of the Polish coking industry. Paliva 43
no.1:21-24 Ja '62.

1. Koksarensky vyzkum, Vyzkumny a zkusebni ustav, Nova hut
Klementa Gottwalda.

MEDRICKY, Z., inz.; KOZINA, A., prof., inz.

Fast heating of coke oven batteries. Paliva 43 no.3:85-87
Mr '63.

1. Vyzkumny a zkusebni ustav, Nova hut Klementa Gottwalda
(for Medricky).

MEDRICKY, Z., inz.

Cooperation of research institutes of the member states of the Council for Mutual Economic Assistance in the field of coking chemistry. Paliva 43 no.5:147-148 My '63.

MEDRICKY, Z. inz.; KLIMEK, J.; PRUDEK, L., inz.

Shall we make use of the selective grinding method? Paliva
43 no.9:265-268 S'63.

1. Vyzkumny a zkusebni ustav, Nova hut Klementa Gottwalda,
Koksarensky vyzkum.

MEDRICKY, Z., inz.

Examination and measurement of some quantities in battery drying and heating. Faliva 43 no. 10:307-310 0 '63.

1. Koksovna, Nova hut Klementa Gottwalda.

ВНИМАНИЕ, 7-е издание, 1964 г.

Removal of the under caused by mist in the top plane.
Paliva 44 no. 3-53-55 7'104.

1. Toksozna, Kova but Flementa Cottwald.

KABELE, Karel, inz.; MEDRICKY, Zdeněk, inz.

Shall we use the method of selective milling in Czechoslovakia?
Paliva 44 no.2:60-61 F'64.

MEDRICKY, Z., inz.; FRNKA, M., inz.

Lerner's hydraulic method in coke oven battery operation.
Paliva 44 no. 7:219-224 J1 '64.

1. Coke Plant, Nova hut Klementa Gottwalda, Ostrava.

MEDRICKY, Z., inz.

Present experiences in the mechanization of coke plant ramps.
Paliva 44 no.8:253-254 Ag '64.

1. Nova hut Klementa Gottwalda, Ostrava - Kuncice.

MEDRICKY, Z., inz.

Maintenance of the rail track for extinguishing cars in winter.
Paliva 44 no.11:349-350 N '64.

1. Nova hut Klementa Gottwalda National Enterprise, Ostrava.

L 18155-66

ACC NR: AP6010376

SOURCE CODE: CZ/0034/65/000/005/0309/0316

AUTHOR: Medricky, Zdenek (Engineer)

ORG: Klement Gottwald New Metallurgical Works, Ostrava-Kuncice (Nova Hut Kl. Gottwalds)

TITLE: Coke quenching

SOURCE: Hutnicka listy, no. 5, 1965, 309-316

TOPIC TAGS: coke, blast furnace

ABSTRACT:

Present Czechoslovak techniques are compared to those used abroad. The Czech method does not allow rapid quenching with large amounts of water; this, however, would give a more uniform and lower content of water in the coke. The correct distribution of the coke on the quenching car, and the relation of the rate of coke pushing to the car slope determine the uniformity and level of water content and the thoroughness of the quenching. The evaporation time needed on the ramp for a given amount of water in the blast furnace coke was calculated, and the influence of the coke size upon this is discussed. The coke should not be kept on the ramp too long. Orig. art. has: 7 figures and 6 tables. [JPRS]

SUB CODE: 11, 13 / SUBM DATE: none / ORIG. REF: 009 / OTH REF: 002

SOV REF: 005

Card 1/1 vmb

MEDRISH, I. N. (Engineer) (NIIkhimmash)

"Welding of a coil reactor from two-layered pipes"

Report presented at the 1st All-Union Conference on welding of heterogeneous metals, at the Inst of Electric Welding im. Ye. O. Paton, 14-15 June 1963.
(Reported in Avtomaticheskaya svarka, Kiev, No. 9, Sept 1963, pp 95-96 author, V. R. Ryabov)
JPRS 24,651, 19 May 64

MEDRISH, I.M., inzh.

Cutting blowpipe for cutting steels with low-pressure oxygen.
Khim. i neft. mashinostr. no.2:39 F '65.

(MIRA 18:4)

L 32795-66 EWT(m)/EWP(v)/T/EWP(t)/ETI/EWP(k) IJP(c) JD/HM/HW
ACC NR: AP6012585 (N) SOURCE CODE: UR/0314/66/000/004/0029/0030

AUTHOR: Medrish, I. N. (Engineer); Bendrik, V. G. (Engineer); Kolyada, A. A. (Engineer);
Shaleyeva, V. L. (Technician)

ORG: none

TITLE: Joint welding of tubes made of two-layer metal, steel Kh14N18V2BR plus M3S
copper

SOURCE: Khimicheskoye i neftyanoye mashinostroyeniye, no. 4, 1966, 29-30

TOPIC TAGS: welding technology, metal welding, steel, copper, metal joining/
Kh14N18V2BR steel, M3S copper

ABSTRACT: Coil pipe reactors made of high-alloy steels are used frequently in the production of mineral fertilizers. In order to make such coils less brittle, the personnel of the VNIPTkhim mash designed and built a reactor incorporating welded structures from two-layer tubes with an (outside diameter, 32 mm; walls 7.5 mm thick). The thicker outer layer was made of Kh14N18V2BR steel and the inner lining consisted of M3S copper 1.5 mm thick. These tubes were built by the All-Union Scientific Research Institute of Pipe Industries

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UDC: 621.643.411.4:621.9-419

L 32795-66

ACC NR: AP6012585

(Vsesoyuznyy nauchno-issledovatel'skiy institut trubnoy promyshlennosti) using conventional methods. The present note describes in detail the three-step welding process: 1) helium-arc manual welding of copper joints; 2) argon-arc welding of the two halves of a protective ring made of steel; and 3) the final manual welding of the external part of the joint. Orig. art. has: 2 figures.

SUB CODE: 13 / SUBM DATE: none

Joining of dissimilar metals 18

Card 2/2

MEDROW, H.

"Making automobile models in the German Democratic Republic." p. 536.

SVET MOTORU. (SVAZ PRO SPOLUPRACI S ARMADOU). Praha, Czechoslovakia, Vol. 9,
no. 17, Aug. 1955.

Monthly List of East European Accessions (EEAI), LC, Vol. 8, No. 9, September 1959.
Uncl.

SURYANU, P.D.; MEDRYA, B.A.; POPA, M.I.; MIRSKIY, P.D.

Case of toxic liver dystrophy terminated by nodular hyperplasia.
Ark. pat. 23 no. 1:84-85 '61. (MIRA 14:1)
(HEPATITIS, INFECTIOUS)

POLAND

MEDRZYCKI, Jerzy

Dept. of Automation and Telemechanics, Warsaw, Polytechnic
(Katedra Automatyki i Telemechaniki, Politechnika Warszawska)

Warsaw, Archiwum automatyki i telemechaniki, No 2, Apr-Jun 1966,
pp 203-209

"Dynamic errors of time-division multipliers."

L 00850-67

ACC NR: AP6029484

SOURCE CODE: PO/0031/66/011/002/0203/0210

AUTHOR: Medrzycki, Jerzy -- Mendzhitski, Ya. 49
B

ORG: Department of Automation and Telemechanics, Warsaw Politechnic
(Politechnika Warszawska katedra automatyki i telemechaniki)

TITLE: Dynamic errors of time-division multipliers

SOURCE: Archiwum automatyki i telemechaniki, v. 11, no. 2, 1966, 203-210

TOPIC TAGS: time division multiplier, dynamic error, linear function, pulse width modulation, analog multiplier, multiplier

ABSTRACT: Time-division multipliers, based on pulse-width and pulse-amplitude modulation, can be considered as the most precise of all analog multipliers. Time-division multipliers can be divided into two types: a) multipliers in which pulse-width modulation is achieved by integration of an analog signal and b) multipliers with an independent generator of a triangular wave. The advantage of the former is considerably better drift compensation. However, on account of the input-signal integration, the pulse-width is a linear function of the input voltage only for time-constant input signals. When input

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L 00850-67

ACC NR: AP6029484

signals are not constant, this function is nonlinear, and therefore a multiplication error arises. The author analyzes only the first type of multipliers. Error analysis is given which arises in the case of a ramp input signal $x = at$. In such a case, the pulse-width is not a linear function of the input voltage. By determining the width of succeeding steps, a series is obtained with terms which are used for determining the error. This error depends on the slope of the function and increases proportionately. Using this relationship, the admissible slope of the ramp function is determined for a given error value, and then the maximum frequency of a sinusoidal signal, which can be multiplied, is calculated. It corresponds to

$$f = 3.3 \frac{kE\delta}{(e_1 - e_2)A^2},$$

where δ is the accepted admissible

error, k is the integration constant of the integrator, A is the sinusoidal signal amplitude, and e_2 and e_1 are trigger-tripping voltages. Orig. art. has: 1 figure and 29 formulas. [Author's abstract]

[NT]

SUB CODE: 09, 12/ SUBM DATE: 03Jul65/ OTH REF: :001/

Card 2/2 pb

26744

S/040/61/025/003/021/026
D208/D304

10 12 50

а.с. о 1103, 1327, 2807

AUTHOR: Medukhovskiy, I.B. (Moscow)

TITLE: Flow around the body of revolution with fins and angle of attack

PERIODICAL: Akademiya nauk SSSR. Otdeleniye tekhnicheskikh nauk. Prikladnaya matematika i mekhanika, v. 25, no. 3, 1961, 561 - 566

TEXT: Proceeding from general relations between the aerodynamic parameters and direction of the impinging stream, the author investigates the dependence of mechanisms of flow on the symmetry of the body in the flow. The dependence of some parameter F on the position of velocity vector of flow V with reference to the body is considered first. In the Cartesian coordinate system e is assumed equal to V/V and V is defined by $e_y, e_z (e_x = \sqrt{1 - e_y^2 - e_z^2})$. Then $F = F(e_y, e_z)$. It is assumed that for $\sqrt{e_y^2 + e_z^2} \leq M (M > 0)$,

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Flow around the body of ...

$F(e_y, e_z)$ can be represented with sufficient accuracy by a part of Taylor series up to n-th order terms:

$$F(e_y, e_z) = \sum_{k=0}^n \sum_{i=0}^k f_{ik} e_y^i e_z^{k-i} \quad (1.1)$$

From (Fig. 1) one has

$$e_y = \sin \alpha \cos \beta, \quad e_z = \sin \alpha \sin \beta \quad (1.2)$$

from which

$$F(\alpha, \beta) = \sum_{k=0}^n F_k(\beta) \sin^k \alpha \quad (1.3)$$

$$F_k(\beta) = \sum_{i=0}^k f_{ik} \cos^i \beta \sin^{k-i} \beta \quad (1.4)$$

results, where (1.3) is valid for all β and $0 \leq \sin \alpha \leq M$; (1.4) is

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Flow around the body of ...

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transformed by the method of multiple arcs into

$$F_k(\beta) = \sum_{0 \leq j \leq k-2} [f_{k-2j, k}^c \cos(k-2j)\beta + f_{k-2j, k}^s \sin(k-2j)\beta] \quad (1.5)$$

Cylindrical coordinates (x, r, θ) are then introduced, γ is given by (Fig.1) and F is considered at the point $A(x, r, \theta)$. Then if for at least one pair of values (γ, θ) (1.3) is true, then $M(\gamma, \theta) \geq 0$ s.t. for $0 \leq \sin \alpha \leq M(\gamma, \theta)$ and for all β, γ, θ , $F(\alpha, \beta, \theta)$ can be expressed as

$$F(\alpha, \beta, \gamma, \theta) = \sum_{k=0}^n F_k(\beta, \gamma, \theta) \sin^k \alpha \quad (1.6)$$

and

$$F_k(\beta, \gamma, \theta) = \sum_{0 \leq j \leq k-2} [f_{k-2j, k}^c(\gamma, \theta) \cos(k-2j)\beta + f_{k-2j, k}^s(\gamma, \theta) \sin(k-2j)\beta] \quad (1.7)$$

If the flow is symmetrical reference the plane of the angle of attack, $F(\alpha, \theta) = F(\alpha, -\theta)$. Also if the sign of F changes on change of θ , then $F(\alpha, \theta) = -F(\alpha, -\theta)$. Elsewhere investigation of the

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Flow around the body of ...

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cases for small angle of attack α and neglecting $O(\alpha^2)$ terms leads to

$$F(\alpha, \theta) = f_{00}^c + f_{11}^c \alpha \cos \theta \quad \text{or} \quad F(\alpha, \theta) = -f_{1.1}^s \alpha \sin \theta. \quad (2.6)$$

System of forces and moments acted upon the body by the stream can be reduced to a principal aerodynamic force vector R and momentum vector M . Then if F means R , then for

$$f_{ykk}^{'c} = -f_{zkk}^{'s}, \quad f_{ykk}^{'s} = f_{zkk}^{'c} \quad (3.9)$$

$$F_x(\alpha, \gamma) = \sum_{k=0}^n F_{rk}(\gamma) \sin^k \alpha, \quad F_r(\alpha, \gamma) = \sum_{k=1}^{n+1} F_{rk}(\gamma) \sin^{k-1} \alpha \quad (3.10)$$

$$F_{uk}(\gamma) = \sum_{0 \leq j \leq k/2} [f_{u,k-2j,k}^c \cos(k-2j)\gamma - f_{u,k-2j,k}^s \sin(k-2j)\gamma] \quad (3.11)$$

determine the components of R or M w.r. to the position of the
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Flow around the body of ...

body. Here index v means either y or z while u means either x or v . On summation of (3.11) by i and introduction of $\xi(i) = 0$ for even i and $= 1$ for odd i ,

$$F_{uk}(\gamma) = \sum_{0 \leq i \leq k/m} \delta(k - im) (f_{u,im,k}^c \cos im \gamma - f_{u,im,k}^s \sin im \gamma) \quad (3.18)$$

is obtained, from which it is seen that the smallest value of k for $F_{uk}(\gamma)$ is dependent on γ , is $k = m$. For a solid of revolution, m can have any value, and for any k only one term corresponding to $i = 0$ is left in Eq. (3.18) and is

$$F_{uk} = \xi(k) f_{uk} \quad (3.19)$$

where $f_{u,o,k}^c \equiv f_{uk}$. From (3.19) and

$$F_v(x) = \sum_{k=0}^n \delta(k) f_{v,k} \sin^k x, \quad F_v(x) = \sum_{k=1}^{n+1} \delta(k) f_{v,k} \sin^{k-1} x \quad (3.20)$$

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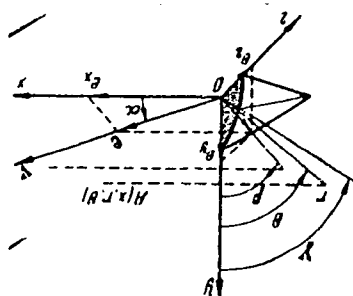
Flow around the body of ...

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results for the solid of revolution, and $R_z = M_x = M_y = 0$. When the velocity of a supersonic incident flow increases, the regions of influence of fins diminish. It is assumed that the stream velocity is such that for $\sin \alpha \leq M$ and all γ , those regions do not overlap. There are 2 Soviet-bloc references, and 1 figure.

SUBMITTED: September 19, 1960

Fig. 1.



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Фиг. 1

SULA, L.; ZAVADILLOVA, Z.; MEDULANOVA, L.; POKORNY, J.

~~SECRET~~
New vaccine against tuberculosis. 2 communication. Characteristics of the strain, Mycobacterium tuberculosis, murine type - Wells OV 116, and preparation of the vaccine. Cas.lek.cesk. 91 no.6:161-171 8 Feb 52.

1. Statni zdravotnický ústav v. Praze. III. odbor pro mikrobiologii a epidemiologii. Oddelení pro výzkum a diagnostiku tuberkulózy.
(MYCOBACTERIUM TUBERCULOSIS,
murine type, characteristics & prep.)

SUIA, L.; ZAVADILOVA, Z.; MEDULANOVA, L.; POKORNY, J.

New vaccine against tuberculosis. II. Characteristics of *Mycobacterium* ~~maris~~ *Wells* OV 166 and preparation of vaccine. Med. dosw. mikrob. 5 no.1:23-37 1953. (CIML 24:5)

1. Of the State Institute of Hygiene, Prague, Czechoslovakia, Third Division of Microbiology and Epidemiology, Department of Tuberculosis Research and Diagnosis.

MEDUNA, J.

in dent. Cesk. stomat. 65 no.4:280-287 J1 '65.

1. Stomatologická klinika lékařské fakulty Palackého University
v Olomouci (prednosta doc. dr. J. Novotný, CSc.).

SKACEL, Karel; SCHWARZER, Miloslav; MEDUNA, Jan

Experience with roentgenological sex determination by means of
the study on ossification changes in fetal vertebral bodies. Cesk.
gyn. 26 no.3:195-196 Ap '61.

1. Gyn. por. klinika lek. fak. PU v Olomouci, Centralni rtg ustav
KUNZ Olomouc, predn. MUDr. J. Doubravsky Gyn. por. odd OUNZ Olomouc,
predn. MUDr. J. Meduna.
(SEX DETERMINATION) (SPINE embryol)
(FETUS radiog)

SKACEL, K.; MEDUNA, J.; NEKULA, J.

What is the position of the fundus uteri during 1st fetal movements?
Cesk. gynek. 26 no.9:649-657 N '61.

1. Gyn. por. klin. PU v Olomouci, OUNZ v Olomouci.

(FETUS physiol) (UTERUS physiol)

MEDUNA, Jiri

SURNAME, Given Names

Country: Czechoslovakia

Academic Degrees: MD

Affiliation: Clinic of Surgery, Faculty of Child Medicine KU /Karlova univer-
sita; Charles University/ (Chirurgicka klinika detskeho lekar-
stvi KU), Prague; Director: Docent Z. VAHALA, MD.

Source: Prague, Prakticky Lekar, Vol 41, No 8, 1961, pp 358-360.

Data: "Carcinoma of the Male Breast."

Authors: NAJEMNIK, Jan

MEDUNA, Jiri

GPO 981643

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MEDUNETSKAYA, A.S.

Characteristics of the cultivation of cyclamens. Sbor. nauch.
rab. TSBS no.2:108-110 '61. (MIRA 15:7)
(Cyclamen)

BAYANDINA, D.G.; MANEVICH, M.Ye.; MELDUNETSKAYA, E.A.

Development of a method for yomesan treatment of lympholeptosis.
Med.paraz.i paraz.bol. 33 no.4:411-415 31-12 '81.

(MIRA 18.1)

1. Otdel gel'mintologii Instituta meditsinskoy parazitologii i
tropicheskoy meditsiny imeni Martsinovskogo i parazitologicheskii
otdel sanitarno-epidemiologicheskoy stantsii Zadachnogo rayona,
Moskva.

GENADINNIK, I.S., kand.med.nauk; MEDUNETSKAYA, V.M.; TARASOVA, L.N.

Case of congenital craniofacial dysostosis (Crouzon's disease). Vest.
rent. i rad. 34 no.4:73-75 ЯI-Ag '59. (MIRA 12:12)

1. Iz glaznoy kliniki (zav. - prof. A.B. Katsnel'son) Chelyabinskogo
meditsinskogo instituta i iz rentgenovskogo otdeleniya Chelyabinskoy
oblastnoy klinicheskoy bol'nitsy (glavnyy vrach N.S. Klyukov).
(HYPERTELORISM case reports)

GENADINNIK, I.S., kand.med.nauk; MEDUNETSKAYA, V.M.; SABANOVA, R.I.

Problem of leontiasis ossium. Vest.otorin. 23 no.2:55-60 P '61.
(MIRA 14:4)

(HEAD—ABNORMALITIES AND DEFORMITIES)

Medunetskiy, V.B.

MOSCOW.

Simplified wall construction of hollow slag concrete stones according to the method of P. F. Luk'ianchikov Moskva, Mashstroizdat, 1950. 14 p. (53-16772)

TH1491.M65

MEDUNIN, A.Ye.

Pendulum observations of acceleration of the force of gravity
made by Litke, Reineke, and Parrot. Trudy Inst.ist.est.1
tekh. 28:451-463 '59. (MIRA 13:5)
(Gravity)

MEDUNIN, A.Ye.

Absolute determinations of the force of gravity by the method of
controlled fall of bodies and by means of long pendulums in
Russia (1892-1911). Ist.i metod.est.nauk no.1:195-200 '60.
(MIRA 14:10)
(Russia—Gravimetry)

S/035/62/000/004/034/056
A001/A101

AUTHOR: Medunin, A. Ye.

TITLE: Studies of Earth's deformations due to lunar-solar attraction,
performed in Russia (1892 - 1920)

PERIODICAL: Referativnyy zhurnal, Astronomiya i Geodeziya, no. 4, 1962, 5,
abstract 4G29 ("Tr. In-ta istorii yestestvozn. i tekhn. AN SSSR",
1961, v. 43, 151-164)

TEXT: The author presents a short information on using horizontal
pendulums, methods of observations with them and results achieved in studies of
elastic Earth's deformations and fluctuations of the vertical, performed by
I. Ye. Kortatstsi at Nikolayev, G. V. Levitskiy at Khar'kov and A. Ya. Orlov at
Yur'yev and Tomsk. L. S. Leybenzon's theoretical investigations are noted on
studying elastic properties of the Earth. History of the first Russian studies
of terrestrial tides presents some interest for modern geophysics. There are
21 references.

[Abstracter's note: Complete translation]

P. Shokin

Card 1/1

MEDUNIN, A.Ye.; BAKH, L.A.

Seventieth Lirthday of S.I.Vavilov. Vop.ist.est.i tekhn. no.12:
240-241 '62. (MIRA 15:4)

(Vavilov, Sergei Ivanovich, 1891-)

MEDUNIN, A.Ye.; KHRGIAN, A.Kh.

Studies on the theory of the figure of the earth conducted in
Russia. Ist. i metod. est. nauk no.3:175-191 '65.

(MIRA 18:12)

1ST AND 2ND CROSS																										3RD AND 4TH CROSS																									
PROCESSES AND PROPERTIES INDEX																																																			
Utilization of the wastes from the chemical plant in <i>Kirovgrad, D. I. Medunin, J. Chem. Ind. (U. S. S. R.)</i> <i>IV: No. 3, 50-4 (1940); Chem. Zvesti, 1940, II, 2522.</i> <i>TI and Co compounds have been recovered from the Cottrell</i> <i>dust of the plant and Se from the sludge formed in the H-</i> <i>SO₄ plant. The waste gases should be processed to produce</i> <i>Na₂SO₄.</i> M. G. Moore																																																			
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The preliminary heating of air as a factor in the intensification of the process of burning flotation pyrites. D. I. Medunin and B. I. Drits. <i>J. Chem. Ind. (U. S. S. R.)</i> 17, No. 8, 25-7(1940).—The economic advantages of this process are shown by math. calcs. H. M. L.																																																			
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MEDUNIA, D. I.

USSR/Chemistry - Sulfuric acid, Anticorrosion materials

FD-512

Card 1/1 : Pub. 50-11/23

Author : Medunia, D. I.

Title : Application of polyisobutene as an anticorrosion material in sulfuric acid production.

Periodical : Khim. prom., 298-299 (42-43), Jul/Aug 1954.

Abstract : According to the operational data given, which were obtained at a large production unit, lining with polyisobutene sheeting that contains carbon and graphite (PSG) protects the walls of iron equipment exposed to the action of hot sulfuric acid having a maximum concentration of 80%. The PSG must in turn be protected with asbestos against the effects of high temperatures and with an acid-resistant ceramic coating against mechanical damage.

Institution : Chemical Plant imeni Stalin.

Submitted :

L 34704-66

ACC NR: AP6025221

SOURCE CODE: CZ/0083/65/000/004/0240/0247

AUTHOR: ~~Medvecky, J.~~ Medvetzkiy, I. (Kosice); ~~Szuttonova, K.~~ Suttorova, K. 2/

ORG: Psychiatric Clinic, Medical Faculty, P. J. Safarik University, Kosice B
(Psychiatricka klinika lekarskej fakulty UPJS)

TITLE: Mental disorders resulting from thyroidectomy 22

SOURCE: Ceskoslovenska psychiatrie, no. 4, 1965, 240-247

TOPIC TAGS: psychoneurotic disorder, thyroid gland, surgery, central nervous system, tissue physiology

ABSTRACT: 22 female patients who had psychopathological symptoms after thyroidectomy were investigated. The operation may result in a disturbance of equilibrium in the corticodiencephalo-hypophyseal area; depressive and anxiety syndromes may occur; before an operation the psychotic state of the patient should be considered; it should not be undertaken in cases of thyreotoxicosis with psychotic symptoms; in patients with hypertonic disease, the operation can precipitate atherosclerotic processes. Ontogenetically older subcortical parts of the CNS are more sensitive to changes caused by the operation than younger ones, e.g. memory and intellect. Orig. art. has: 4 figures and 1 table. [Based on authors' Eng. abst.] [JPRS]

SUB CODE: 06 / SUBM DATE: none / ORIG REF: 014 / SOV REF: 001
OTH REF: 013

Card 1/1 MYS

09/6 0587

MEDUNITSYN, N.V.

Fixation of sheep erythrocytes by cat and dog lymph nodes.
Biul.eksp.biol. i med. 48 no.7:42-45 J1 '59. (MIRA 12:10)

1. Iz kafedry patologicheskoy fiziologii (zav. - chlen-korrespondent AMN SSSR prof.A.D.Ado) II Moskovskogo gosudarstvennogo meditsinskogo instituta imeni N.A.Pirogova (dir.-dotsent M.G.Sirotkina). Predstavlena deystvitel'nym chlenom AMN SSSR N.N.Sirotininyam.

(LYMPH NODES - physiol.)

(ERYTHROCYTES)

NEDELIN TSYN, N. V., Cand Med Sci -- (uiss) "On the fixing and antibody forming
function of the lymphatic nodes," Moscow, 1960, 13 pp (Second Moscow State
Medical Institute im N. I. Pirogov) (HL, 39-66, 116)

MEDUNITSYN, N.V. (Moskva)

Experimental fistulae of the thoracic duct and lymphatic vessels
of the extremities and method for collecting lymph from the lymphatic
vessels in cats and dogs. Pat.fiziol.ieksp.terap. 4 no.2:69-71
Mr-Apr '60. (MIRA 14:5)

1. Iz kafedry patologicheskoy fiziologii (zav. - cheln-korrespondent
AMN SSSR prof. A.D.Ado) II Moskovskogo gosudarstvennogo meditsinskogo
instituta imeni N.I.Pirogova.
(LYMPHATICS)

ADO, A.D.; MEDUNITSYN, N.V.

Inflammation as a factor in lymph node reactivity. Eksper. khir. 5
no. 2:3-7 Mr-Apr '60. (MIRA 14:1)
(LYMPHATICS) (INFLAMMATION)

MEDUNITSYN, N.V.

Problem of the barrier function of the lymph nodes. Eksper. khir.
5 no. 3:30-33 My-Je '60. (MIRA 14:1)
(LYMPHATICS)

MEDUNITSYN, N.V.

Nonspecific stimulation of antibody production; author's abstract.
Zhur. mikrobiol. epid. i immun. 31 no. 4:132 Ap '60.

(MIRA 13:10)

1. Iz kafedry patofiziologii 2-go Moskovskogo meditsinskogo
instituta imeni Pirogova.

(ANTIGENS AND ANTIBODIES)

MEDUNITSYN, N.V.

Role of inflammation in the barrier function of the lymph nodes.
Biol. eksp. biol. i med. 49 no.1:49-53 Ja '60. (MIRA 13:7)

1. Iz kafedry patologicheskoy fiziologii (zav. - chlen-korrespondent
AMN SSSR prof. A.D. Ado) II Moskovskogo gosudarstvennogo meditsin-
skogo instituta N.N. Sirotinym.
(LYMPHATICS) (ESCHERICHIA COLI)

MEDUNITSYN, N.V.

Antigen fixation by the cells of sensitized animals. Vestn.
Akad. med. nauk SSSR 18 no.4:31-38 '63 (MIRA 17:4)

1. Iz nauchno-issledovatel'skoy allergologicheskoy laboratorii
AMN SSSR.

MEDUNITZYN, N.V. (Moskva)

Delayed type of hypersensitivity. Usp. sevr. biol. 56 no.1:
77-89 J1-Ag'63. (MIRA 16:10)
(ALLERGY)

MEDUNITSYN, N.Y.

Immunofluorescent study of antigen formation in increased
sensitivity of the reference type. (see. 19-43-44)
39-43-44.

1. Neutrophilic granulocytes (leukocytes) (leukocytes) (leukocytes)
MEN 1334, 1334.

MEDUNITSYN, N.V.

Effect of an adjuvant on the formation process of antibodies;
immuno-fluorescence study. Zhur. mikrobiol., epid. i immun. 2
no. 7:113-118 J1 '65. (MIRA 18:11)

1. Nauchno-issledovatel'skaya allergologicheskaya laboratoriya
AMN SSSR, Moskva.

L 5255-66

ACC NR: AP5027482

SOURCE CODE: UR/0219/65/060/010/0085/0088

AUTHOR: Medunitsyn, N. V.; Lukmanova, F. F.

ORG: Scientific Research Laboratory of Allergology AMN SSSR, Moscow
(Nauchno-issledovatel'skaya allergologicheskaya laboratoriya AMN SSSR)

TITLE: Use of the immunofluorescent method for the study of the
formation of antibodies to pollen antigens

SOURCE: Byulleten' eksperimental'noy biologii i meditsiny, v. 60,
no. 10, 1965, 85-88

TOPIC TAGS: test method, fluorescence, plant physiology, experiment
animal, antibody, antigen, immunization

ABSTRACT: Coons' indirect method was used in guinea pigs to study the
process of antibody formation in the popliteal, inguinal, axillary,
and lymphatic glands and the spleen at periods from 5 to 21 days after
each of 2 injections for immunization and reimmunization with an
extract from Poleum pratense pollen; cross immunological reactions
between different types of pollen of grasses and trees were also studied
by this method. Control tests were conducted by precipitation reaction
in agar. Preparation of the immune serum with fluorochrome consisted
in isolating the globulin fraction, marking the protein with fluorescein

Card 1/2

UDC: 616-022.854-097

L 5255-66

ACC NR: AP5027482

isothiocyanate, and a process to eliminate nonspecific fluorescence and mix it with powder of guinea pig liver and rabbit spinal marrow. At various periods after immunization, the animals were sacrificed, the tissues were prepared for inspection, treated with pollen extract, washed, treated with the fluorescent serum, washed again (buffer solution), and enclosed in glycerol for luminescence study. Luminescence was seen throughout, except on the 5th day after the first injection, and was particularly strong in the regional lymph nodes. Antibody fluorescence resembled that of plasma cells of varying age. All guinea pig sera gave precipitation reactions in agar. Comparison of Coons' method with the precipitation reaction showed that the first was more sensitive in the early immunity stages. Cross reaction tests in two variations of Coons' method were used to determine immunological reactions between different types of grass and tree pollen. It was found that the pollen of timothy, cock's foot, rye grass, fescue, brome, foxtail, and meadow grass possess general antigenic properties. The pollen of *Phleum pratense* gave weak cross reactions with rye pollen and failed to give such reaction with ragweed, goosefoot, and tree pollen. It is concluded that the immunofluorescent method may be used for the study of general antigenic properties in the various antigen species. Orig. art. has: 1 fig.

SUB CODE: LS/ SUBM DATE: 30Jun64/ ORIG REF: 003/ OTHER REF: 005

P C
Card 2/2

Medunov F.

MOROCCLIN, V.; MEDUNOV, F.

New method of marking clothes. Prom.koop. no.8:15 Ag '57.
(MLRA 10:9)

(Cleaning and dyeing industry)

MARGOLIN, V.; MEDUNOV, P.

Quick dry cleaning. Prom. koop. 12 no.1:25 Ja '58. (MIRA 11:1)
(Moscow--Cleaning and dyeing industry)

MEDUNOV, F. (g. Kalinin, g. Ivanovo); MARGOLIN, V.

Losses in chemicals have been eliminated. Prom.koop. 12 no.11:17
N '58. (MIRA 11:11)

1. Nachal'nik otdela khimchistki Glavnogo upravleniya predpriyatiy
bytovogo obsluzhivaniya Rospromsoвета (for Medunov). 2. Starshiy
inzhener otdela khimchistki Glavnogo upravleniya predpriyatiy
bytovogo obsluzhivaniya Rospromsoвета (for Margolin).
(Cleaning and dyeing industry)

MEDUNOV, V. K.

Cand. Technical Sci. Mbr., Donets Industrial Inst. im. Khrushchev, -cl949-.
"Dynamic Brake Action of Mine Elevators Driven by Asynchronous Motor,"
Ugol', No. 5, 1949; "Analytical Calculation of the Characteristics of an
Induction Motor in Dynamic Braking," Elektrichestvo, No. 8, 1949.

MEDUNOV, V. K.

PA 66/49T34

USSR/Engineering - Motors, Electric Aug 49
Motors, Induction

"Analytical Calculation of the Characteristics
of an Induction Motor in Dynamic Braking," V. K.
Medunov, Cand Tech Sci, Donetsk Ind Inst ~~Inst~~ ^{N.S.}
Khrushchev, 4 pp

"Elektrichestvo" No 8

Known methods for calculating mechanical
characteristics of an induction motor in dynamic
braking are only approximate. Suggests new
equations whose use will reduce the error in de-
sign considerably. Illustrates theoretical re-
search by experimental data obtained in the
laboratory.

66/49T34

MEJUNOV, V.K.; RYBALKO, N.P.

Function of the feedback in the diagram of dynamic braking of
induction motors in hoisting units. Ugol' Ukr. 3 no.9:20-23
S '59. (MIRA 13:2)

(Hoisting machinery--Brakes)

IVANCIC, Radovan, dr.; MEDUR, Miroslav, dr.; MARK, Bruno, dr.

On a case of parietal aneurysm of the heart. Liječn. vjesn. 83
no.3:249-257 '61.

1. Iz Interne klinike i Centralnog radioloskog zavoda Med. fakulteta
u Zagrebu. (HEART DISEASES case reports) (ANEURYSM case reports)

YEFIMOV, A.V.; BELOV, M.I., doktor ist. nauk; PEDUSHEVSKAYA, G.M.,
kand. ist. nauk;

[Atlas of geographical discoveries in Siberia and north-
western America in the 17th and 18th centuries] Atlas
geograficheskikh otkrytii v Sibiri i v Severo-Zapadnoi
Amerike XVII-XVIII vv. Moskva, Nauka, 1964. 134 p.
(MIRA 17:9)

1. Chlen-korrespondent AN SSSR (for Yefimov).

MEDUSKI, J. O.

MEDUSKI, J. O. biochemii. Warszawa, Ksiazka i Wiedza, 1950.
123 p. (Biochemistry)

SO: Monthly list of East European Accessions, LC, Vol. 3, No. 1,
Jan. 1954, Uncl.

Meduski, J.

✓ The effect of methylthiourea on adrenal cortex. J. Meduski, A. Linde, and H. Szemplowska (Oddział Farm. Doświad. Chem. P.Z.H., Warsaw). *Reczniki Państwowego Zakładu Hig.* 2, 161-71(1951).—Subcutaneous injection of mice (6-9 g.) with 0.1 ml. 0.25% methylthiourea (I) suspension for 5 days before adrenalectomy decreased the survival time (3, 4, 5, and 6 days after adrenalectomy the percentage dead in the control was 43, 56, 65, and 73 that in the I-treated was 55, 64, 91, and 100 resp.). Treating these mice with deoxycorticosterone acetate (DOCA) 0.125 mg./day after adrenalectomy increased the survival time (after 3, 4, 5, and 6 days the percentage dead was 13.5, 13.5, 16, and 35, resp.). Force feeding of rats 5 mg. I/day for 10 days had no effect on adrenal wt. but increased the reducing property of adrenals (reducing compds. measured as DOCA; controls had 77.7, and I-fed had 59.7 γ). Feeding 1% iodinated protein for 10 days to rats statistically decreased body wt., increased adrenal wt. and decreased adrenal reducing power (40-60 γ in terms of DOCA).
L. J. Piotrowski

(3)

MEDUSKI, J.; LINDE, A.; STELMACHOWSKA, A.

Oxygen consumption in myocardial tissue suspension. Acta. physiol. polon.
3 no. 1:117-118 1952. (CLML 22:5)

1. Of the Biochemical Division of the State Institute of Hygiene in Warsaw.

MEDUSKI, J.; LINDE, A.; STELMACHOWSKA, A.

Effect of lower alcohols on oxygen consumption in suspension of
myocardial tissue. Acta physiol. polon. 3 no. 1:119-120 1952.

(CML 22:5)

1. Of the Biochemical Division of the State Institute of Hygiene in
Warsaw.

MEDUSKI, J.; LINDE, A.; GAWECKA, I.

The effect of washing heart muscle brei on its biological activity.

II. Citric acid metabolism in washed brei. Acta physiol. polon. 3 Suppl.
3: 284-285 1952. (CLML 24:1)

1. Of the Department of Secondary Changes of the Biochemistry Division
(Head--Prof. Jozef Heller, M.D.) of the State Institute of Hygiene.

MEDUSKI, J.; LINDE, A.; GRAD, W.

The effect of washing heart muscle brei in its biological activity.
III. Oxygen intake in washed brei. Acta physiol. polon. 3 Suppl. 3:
285-287 1952. (CML 24:1)

1. Of the Department of Secondary Changes of the Biochemistry Division
(Head--Prof. Jozef Heller, M.D.) of the State Institute of Hygiene.

MEDUSKI, J.; PIECHOCKI, T.; GAWECKA, I.; LINDE, A.

Inactivation of strophanthidin K by the heart muscle in vitro and its relation to citric acid metabolism. Acta physiol. polon. 3 Suppl. 3: 287-292 1952. (CIML 24:1)

1. Of the Department of Secondary Changes of the Biochemistry Division (Head—Prof. Jozef Heller, M.D.) of the State Institute of Hygiene.

POL.

Adaptation of *Escherichia coli* to the utilization of citrate, and nitrogen content of cells. I. Malachowski, A. Limle, and J. Maluski (Państwowy Zakład Hig., Warsaw, Poland). *Arch. Biochem. Biophys.* 1, 133-14 (1954). -- *E. coli* grown for 48 hrs. on synthetic medium with varying concent. of $(\text{NH}_4)_2\text{SO}_4$ contained 19.3, 9.7, 7.6, and 4.76% protein N (dry wt.) when 500, 100, 50, and 0 mg. N/l. medium were used, resp. None of these cultures grew when transferred to Koser's medium (I) (phosphate- MgSO_4 -NaCl-Na citrate), but grew well in Koser's medium with added glucose (II). A 24-hr. growth in II adapted the cells to citrate; so that they grew in I during 4 consecutive transfers. The extent of adaptation depended on the N content of the original cells; the adapted cells utilizing citric acid from I in a ratio of 30:27:12.5:10.5 for the above-described cells. I. Z. Rojerts.

MEDUSKI, Jerry

Transamination reaction in plants. Postepy biochem. 2:59-76 1954.

(PLANTS, metabolism,
transamination)

(AMINO ACIDS, metabolism,
plants, transamination)

MEDUSKI J.

MEDUSKI, J.; RZENDOWSKA, F.

Peroxidase function of *Penicillium chrysogenum* during production of penicillin. Acta physiol. polon. 5 no.4:635-638 1954.

1. Z Oddziału Przemiany Pośredniej Działu Biochemii P.Z.H. w Warszawie.

(OXIDASES,

peroxidase in *Penicillium chrysogenum* during penicillin synthesis)

(PENICILLIUM,

chrysogenum, peroxidase metab. during penicillin synthesis)

(PENICILLIN, metabolism,

Penicillium chrysogenum biosynthesis, peroxidase metab. in)

MEDUSKI, J.

MEDUSKI, J.; MANDES, Z.; ZABLOCKA, B.; KOZARZEWSKA-SAPER, B.

Hyperglycemic properties of Polish insulin. Acta physiol. polon.
5 no.4:639-640 1954.

1. Z Oddziału Przemiany Posredniej P.Z.H. i z Zakladu Farmakologii
Akademii Medycznej w Warszawie.
(INSULIN,)

MEDUSKI, J.

The peroxidase activity of *Penicillium chrysogenum* in penicillin production metabolism. J. Meduski and F. Racinska (State Inst. of Hygiene, Warsaw). Congr. Intern. Biochim., *Reunions commun.*, 3rd Congr., Brussels 1955, 180-1 (in English). Intracellular peroxidase (I) can be detected when a penicillin-producing strain of *P. chrysogenum* is grown in a corn steep and lactose medium in submerged cultures in large fermentors. Structural proteins are involved in the peroxidase activity (II) (at a max. after 48 hrs. fermentation), since washing of the homogenized mycelium leaves the homogenate active. I has an optimum pH of about 8 and an optimum temp. of 35°. Pyrogallol acts as an acceptor in the II, with a k_m of $4 \times 10^{-4} M$ at the half-max. velocity. The velocity const. for II at different temps. indicate an activation energy of about 9550 cal./mole. I appears to act not only on compds. of low mol. wt. but also upon the proteins of the mycelium as well.

W. C. Tobia

2

MEDUSKI, J.; ZBROZYNA, A.; ZAKRZEWSKA, A.; OLKOWSKA, D.

Studies on phospholipase C in *Clostridium perfringens*;
saturated lecithins as a substrate of phospholipase C in
aqueous medium. Acta microb. polon 5 no.1-2:73-76 1956.

1. Z Pracowni Przemiany Posredniej Zakladu Biochemii PZH w
Warszawie.

(LIPASES,

phospholipase C from *Clostridium perfringens*, eff.
on saturated lecithins in aqueous solution (Pol))

(CLOSTRIDIUM PERFRINGENS,

same)

(LECITHIN,

eff. of phospholipase C from *Clostridium perfringens* on
lecithin in aqueous solution (Pol))

WEDUSKI, J.; MALACHOWSKA, I.; LINDE, A.

Studies on the effect of conditions of culture on the course of enzymatic activity in *Escherichia coli*. *Acta microb. polon* 5 no.1-2:53-56 1956.

1. Z Pracowni Przemiany Posredniej Zakladu Biochemii i PZH w Warszawie.

(*ESCHERICHIA COLI*, culture,
eff. of adaptation to citrates on enzymatic activity (Pol))
(*CITRATES*,
eff. of adaptation of *E. coli* to citrates on enzymatic
activity (Pol))

MEDUSKI, J.

"The origin of the biochemistry of polymolecular compounds"

p. 29 (Review, Journal on Polish science and scientific publications issued
by the Polish Academy, Vol 2, no. 1/2, Jan/June 1957, Warsaw, Poland)

Monthly Index of East European Accessions (EEAI) LC, Vol. 6, No. 1, Jan. 59.

Meduski, Jerzy

20-2-29/50

AUTHORS: Meduski, Jerzy, and Volkova, M. S.

TITLE: The Determination of the Molecular Weight of Phospholipase- C of Clostridium Perfringens Welchii by the Radiation Method (Radiatsionnoye opredeleniye molekulyarnogo vesa fosfolipazy - C Clostridium perfringens Welchii)

PERIODICAL: Doklady AN SSSR, 1957, Vol. 116, Nr 2, pp. 266 - 269 (USSR)

ABSTRACT: In biochemistry the determination of the properties of the main exotoxin of the above-mentioned microorganism, which is one of the most widely spread pathogenic microbes of man and causes the gas-gangrene, is a task of topical interest in the study of this disease. This is phospholipase-C which splits up into unsaturated and saturated lecithin as well as into lecithino-proteins under separation of phosphorylcholine, and which is highly sensitive to surface-activation. Therefore it was hitherto not possible to isolate this enzyme in a pure state. The modern methods of protein chemistry, however, make it possible to obtain some physico-chemical data also from non-purified dry preparation of the enzyme. Among those is the determination of the molecular weight by means of activation by radiation. The determination of the weight of this enzyme by means of radiation inactivation by γ -rays is the pur-

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20-2-29/50

The Determination of the Molecular Weight of Phospholipase - C of Clostridium
Perfringens Welchii by the Radiation Method

pose of the present paper. It was proved that the molecular weight of the phospholipase C of the above-mentioned microbe amounts to 106000 ($\pm$ 3000) and that the particles of the enzyme apparently have a spherical shape. The dry preparation and its method of production are thoroughly described. The method of the quantitative series determination of the activity of phospholipase C is based on the modification according to Meduski & Uspenskaya. After radiation, the preparation which was treated and that which was not treated were examined for their activity in various solvents, among others in borate buffer (pH 8,6) and in water (pH 6,6). Table 1 gives the relation of the residual activity to the initial activity n/n_0 in connection with gradually increasing doses of radiation. In graphical representations of the dependence of the residual activity on the dose of radiation a straight line is obtained in semilogarithmic coordinates (figure 1). For a calculation of the sensitive unit of weight of phospholipase C the following formula may be used:

$$\frac{n}{n_0} = e^{-vI} \quad (I), \text{ where } v \text{ is the volume of}$$

the unit sensitive to ionization, I - the number of primary ionizations per 1 ml of the dry enzyme. The value "v" was calculated in

Card 2/4

20-2-29/50

The Determination of the Molecular Weight of Phospholipase - C of Clostridium
Perfringens Welchii by the Radiation Method

two ways. The first way is based on the graphic determination of the dose at which only 37 % of the biological activity remains in the preparation investigated; as $e^{-1} = 0,37$, vI in this connection $= 1$ and $v = 1/I$. From the diagram (figure 1) it was found that the dose causing 63 % inactivation amounts to $4,6 \cdot 10^6 r$. The second way is based on the same equation, but " v " is calculated from the logarithmic form of the equation:

$$\ln \frac{n}{n_0} = -vI. \text{ After calculat-}$$

ing the molecular weight, the authors introduced it together with the diffusion constant into Svedenborg's equation and from this calculated the probable constant of sedimentation of phospholipase C, i.e. $S = 7,9 \cdot 10^{-13}$. There are 1 figure, 1 table and 15 references, 2 of which are Slavic.

ASSOCIATION: Institute for Biochemistry AN USSR imeni A. N. Bakh and State Institute for Hygiene as well as Committee for Biochemistry of the Polish Academy of Science (Institut biokhimii im. A. N. Bakha Akademii nauk SSSR, Gosudarstvennyy Institut gigiyeny i Biokhimicheskoy komitet Pol'skoy Akademii nauk)

Card 3/4

20-2-29/50

The Determination of the Molecular Weight of Phospholipase - C of Clostridium
Perfringens Welchii by the Radiation Method

PRESENTED: June, 3, 1957, by A. I. Oparin, Academician

SUBMITTED: June 3, 1957

AVAILABLE: Library of Congress

Card 4/4

M-00571. Y.

20-3-30-/52

AUTHORS: Uspenskaya, V. D. , and Meduski Yezhi

TITLE: Electrophoretic Investigation of Phospholipase C (Elektroforeticheskoye issledovaniye fosfolipazy C)

PERIODICAL: Doklady AN SSSR, 1957, Vol. 117, Nr 3, pp. 466 - 469 (USSR)

ABSTRACT: Phospholipase C is one of the pathologically most active exotoxins of the bacterium of the human gasgangrene (Clostridium perfringens). Up to now this ferment could not be isolated in a pure state, and its molecular weight only recently could be defined (reference 3) by means of the radiation inactivation. It was the task of the here described experiments, to obtain an electrophoretic characterization of the phospholipase C by the means of zonal electrophoresis, as well as further to clean the ferment by electrophoretic fractionating. 5 preparations of the enzyme (Varshavskiy-1 and -2, TF-1 and -2, from Moscow, as well as the preparation of the α -toxin of the Cl. perfringens TsIEM, Moscow), were investigated. Furthermore, a preparation of the Cl. oedematiens original Nr 4 Ts IEM was proved. The Moscow preparations were 7, respectively 8,5 years old. The method of investigation is described here. According to their specific activity both Varshavskiy-preparations and the TsIEM were equal. They exceed TF-1 and -2 5-fold (table 1). The activity

Card 1/3